

ABSTRACT OF THE DISCLOSURE

An OCDMA transmission arrangement involves encoding both first and second nominally orthogonal polarization signals with a same long code, and transmitting the long-encoded first and second nominally orthogonal polarization signals from respective first and second transmission sources to at least one destination. A corresponding OCDMA demodulating arrangement demodulates the first and second nominally orthogonal polarization signals that were transmitted from respective first and second transmission sources after having been encoded with the same long code. The demodulation arrangement involves receiving the encoded first and second nominally orthogonal polarization signals, and applying the same long code to the received encoded first and second nominally orthogonal polarization signals.